## AMENDMENTS TO THE CLAIMS

## 1-45. Cancell d.

- 46. **(Previously Presented)** A cationic vinyl addition polymer comprising in polymerized form
- (a) at least one non-ionic monomer having a non-aromatic hydrophobic monomer:
- (b) at least one cationic monomer; and
- (c) (meth)acrylamide;

wherein the cationic vinyl addition polymer is prepared from a monomer mixture comprising from 75 to 95 mole% of (meth)acrylamide;

(a) said at least one non-ionic monomer having a non-aromatic hydrophobic group comprising a monomer represented by the general formula (IV)

$$CH_2 = C - R_1$$
  $R_8$  (IV)  
 $O = C - A - B - N$   
 $R_9$ 

wherein  $R_1$  is H or  $CH_3$ ; A and B represent a single bond between C and N (O=C–NR<sub>8</sub>R<sub>9</sub>);  $R_8$  and  $R_9$  are each H or a substituent containing an alkyl group having from 1 to 6 carbon atoms, at least one of  $R_8$  and  $R_9$  being a substituent containing an alkyl group having from 2 to 6 carbon atoms;

- (b) said at least one cationic monomer comprising a cationic monomer selected from the group consisting of:
  - (i) cationic monomers represented by the general formula (I):

$$CH_2 = C - R_1$$
  $R_2$  (I)  
 $O = C - A - B - N^+ - R_4$   $X^ R_3$ 

wherein  $R_1$  is H or  $CH_3$ ;  $R_2$  and  $R_3$  are each H or an alkyl group having from 1 to 3 carbon atoms; A is O or NH; B is an alkylene group of from 2 to 4 carbon atoms or a hydroxy propylene group;  $R_4$  is a non-aromatic hydrocarbon group containing from 4 to 8 carbon atoms; and  $X^-$  is an anionic counterion;

(ii) cationic monomers represented by the general formula (III):

$$CH_2 = C - R_1$$
  $R_2$  (III)  
 $O = C - A - B - N^+ - R_7$   $X^-$   
 $R_3$ 

wherein  $R_1$  is H or  $CH_3$ ;  $R_2$  and  $R_3$  are each H or an alkyl group having from 1 to 3 carbon atoms; A is O or NH; B is an alkylene group of from 2 to 4 carbon atoms, or a hydroxy propylene group;  $R_7$  is H, an alkyl group having from 1 to 3 carbon atoms, a benzyl group or a phenylethyl group; and  $X^-$  is an anionic counterion;

- (iii) and mixtures thereof.
- 47. **(Original)** The cationic vinyl addition polymer of claim 46, wherein the (meth)acrylamide is acrylamide.

## 48-51. Cancelled.

- 52. **(Original)** The cationic vinyl addition polymer of claim 46, wherein the non-aromatic hydrophobic group is an alkyl group selected from n-propyl, iso-propyl, n-butyl, iso-butyl and t-butyl.
- 53. (Original) The cationic vinyl addition polymer of claim 46, wherein the cationic vinyl addition polymer comprises in polymerized form a cationic monomer represented by the general formula (I):

$$CH_{2} = C - R_{1} \qquad R_{2}$$

$$| \qquad | \qquad |$$

$$O = C - A - B - N^{+} - R_{4} \quad X^{-}$$

$$| \qquad |$$

$$R_{3}$$

wherein  $R_1$  is H or  $CH_3$ ;  $R_2$  and  $R_3$  are each H or an alkyl group having from 1 to 3 carbon atoms; A is O or NH; B is an alkylene group of from 2 to 4 carbon atoms or a hydroxy propylene group;  $R_4$  is a non-aromatic hydrocarbon group containing from 4 to 8 carbon atoms; and  $X^-$  is an anionic counterion.

## 54. Cancelled.

55. (**Previously Presented**) The cationic vinyl addition polymer of claim 46, wherein the cationic vinyl addition polymer is prepared from a monomer mixture comprising from 5 to 25 mole% of non-ionic monomer having a non-aromatic hydrophobic group, and from 95 to 75 mole% of at least one cationic monomer and (meth)acrylamide.

(New) The cationic vinyl addition polymer of claim 46, wherein the cationic vinyl addition polymer comprises in polymerized form a cationic monomer represented by the general formula (I):

$$CH_2 = C - R_1$$
  $R_2$  (I)  
 $O = C - A - B - N^+ - R_4$   $X^-$   
 $R_3$ 

wherein  $R_1$  is H or  $CH_3$ ;  $R_2$  and  $R_3$  are each H or an alkyl group having from 1 to 3 carbon atoms; A is O or NH; B is a hydroxy propylene group;  $R_4$  is a non-aromatic hydrocarbon group containing from 4 to 8 carbon atoms; and  $X^-$  is an anionic counterion.

57. **(New)** The cationic vinyl addition polymer of claim 46, wherein the cationic vinyl addition polymer comprises in polymerized form a cationic monomer represented by the general formula (III):

$$CH_2 = C - R_1$$
  $R_2$  (III)  
 $O = C - A - B - N^+ - R_7$   $X^-$   
 $R_3$ 

wherein  $R_1$  is H or  $CH_3$ ;  $R_2$  and  $R_3$  are each H or an alkyl group having from 1 to 3 carbon atoms; A is O or NH; B is a hydroxy propylene group;  $R_7$  is H, an alkyl group having from 1 to 3 carbon atoms, a benzyl group or a phenylethyl group; and  $X^-$  is an anionic counterion.